

# UTILITY PATENT APPLICATION TRANSMITTAL

(Only for new nonprovisional applications under 37 C.F.R. 1.53(b))

Attorney Docket No. 8956-000105/US

First Inventor Kyu-Nam LIM and Kye-Hyun KYUNG

Title SEMICONDUCTOR MEMORY DEVICE HAVING HIERARCHICAL  
STRUCTURE OF DATA INPUT/OUTPUT LINE AND PRECHARGE  
METHOD THEREOF

Express Mail Label No. N/A

## APPLICATION ELEMENTS

See MPEP chapter 600 concerning utility patent application contents.

1. ☒ Fee Transmittal Form (e.g., PTO/SB/17)  
(Submit an original and a duplicate for fee processing)
2. ☐ Applicant claims small entity status.  
See 37 CFR 1.27.
3. ☒ Specification [Total Pages 23]  
(preferred arrangement set forth below)  
- Descriptive title of the Invention  
- Cross References to Related Applications  
- Statement Regarding Fed sponsored R & D  
- Reference to sequence listing, a table,  
or a computer program listing appendix  
- Background of the Invention  
- Brief Summary of the Invention  
- Brief Description of the Drawings (if filed)  
- Detailed Description  
- Claim(s)  
- Abstract of the Disclosure
4. ☒ Drawing(s) (35 U.S.C. 113) [Total Sheets 5]
5. Oath or Declaration [Total Pages 3]  
a. ☒ Newly executed (original or copy)  
b. ☐ Copy from a prior application (37 CFR 1.63 (d))  
(for a continuation/divisional with Box 18 completed)  
i. ☐ DELETION OF INVENTOR(S)  
Signed statement attached deleting inventor(s)  
named in the prior application, see 37 CFR  
1.63(d)(2) and 1.33(b).
6. ☐ Application Data Sheet. See 37 CFR 1.76

## ADDRESS TO:

Commissioner for Patents  
Box Patent Application  
P.O. Box 1450  
Alexandria, VA 22313-1450

7. ☐ CD-ROM or CD-R in duplicate, large table or  
Computer Program (Appendix)
8. Nucleotide and/or Amino Acid Sequence Submission  
(if applicable, all necessary)  
a. ☐ Computer Readable Form (CRF)  
b. Specification Sequence Listing on:  
i. ☐ CD-ROM or CD-R (2 copies); or  
ii. ☐ paper  
c. ☐ Statements verifying identity of above copies

## ACCOMPANYING APPLICATIONS PARTS

9. ☒ Assignment Papers (cover sheet & document(s))
10. ☐ 37 C.F.R. §3.73(b) Statement of Power of Attorney  
(when there is an assignee)
11. ☐ English Translation Document (if applicable)
12. ☒ Information Disclosure Statement (IDS)/PTO-1449 ☐ Copies of IDS Citations
13. ☐ Preliminary Amendment
14. ☒ Return Receipt Postcard (MPEP 503)  
(Should be specifically itemized)
15. ☒ Certified Copy of Priority Document(s)  
(if foreign priority is claimed)
16. ☐ Request and Certification under 35 U.S.C. 122  
(b)(2)(B)(i). Applicant must attach form PTO/SB/35  
or its equivalent.
17. ☐ Other: \_\_\_\_\_

18. If a CONTINUING APPLICATION, check appropriate box, and supply the requisite information below and in a preliminary amendment,  
or in an Application Data Sheet under 37 CFR 1.76:☐ Continuation ☐ Divisional ☐ Continuation-in-part (CIP)

of prior application No. \_\_\_\_\_ / \_\_\_\_\_

Prior application information: Examiner \_\_\_\_\_

Group / Art Unit: \_\_\_\_\_

For CONTINUATION or DIVISIONAL APPS only: The entire disclosure of the prior application, from which an oath or declaration is supplied  
under Box 5b, is considered a part of the disclosure of the accompanying or divisional application and is hereby incorporated by reference.  
The incorporation can only be relied upon when a portion has been inadvertently omitted from the submitted application parts.

## 17. CORRESPONDENCE ADDRESS

☒ Customer Number or Bar Code Label

30593

or ☐ Correspondence address below

30593

(Insert Customer No. or Attach bar code label here)

Name	Harness, Dickey & Pierce, P.L.C.				
Address	P.O. Box 8910				
City	Reston	State	VA	Zip Code	20195
Country	United States of America	Telephone	703-668-8000	Fax	703-668-8200

Name (Print/Type)	John A. Castellano	Registration No. (Attorney/Agent)	35,094
Signature			Date September 12, 2003

 10/660568  
 09/12/03

18324 U.S. PTO  
09/12/03

PTO/SB/17 (10-01)

Approved for use through 10/31/2002. OMB 0551-0002  
U.S. Patent and Trademark Office: U.S. DEPARTMENT OF COMMERCE

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

## FEE TRANSMITTAL for FY 2003

Patent fees are subject to annual revision.

TOTAL AMOUNT OF PAYMENT (\$) 790.00

### Complete If Known

Application Number NEW APPLICATION  
Filing Date September 12, 2003  
Inventor(s)  
Examiner Name Unassigned  
Group / Art Unit Unassigned  
Attorney Docket No. 8956-000105/US

### METHOD OF PAYMENT (check one)

1. ☒ The Commissioner is hereby authorized to charge indicated fees and credit any over payments to:  
Deposit Account Number 08-0750  
Deposit Account Name Harness, Dickey & Pierce, P.L.C.  
☒ Charge Any Additional Fee Required Under 37 CFR 1.16 and 1.17  
☐ Applicant claims small entity status. See 37 CFR 1.27

2. ☒ Payment Enclosed:  
☒ Check ☐ Credit card ☐ Money Order ☐ Other

### FEE CALCULATION

1. BASIC FILING FEE				
Large Entity	Small Entity	Fee Code	Fee Description	Fee Paid
101	750	201	Utility filing fee	750
106	320	206	Design filing fee	
107	520	207	Plant filing fee	
108	750	208	Reissue filing fee	
114	160	214	Provisional filing fee	
SUBTOTAL (1)				(\$ 750)

### 2. EXTRA CLAIM FEES

Total Claims	Extra Claims	Fee from below	Fee Paid
7	-20**	0	0
Independent Claims	3	-3**	0
Multiple Dependent	0		0

Large Entity	Small Entity	Fee Code	Fee Description	Fee Paid
103	18	203	Claims in excess of 20	
102	84	202	Independent claims in excess of 3	
104	280	204	Multiple dependent claim, if not paid	
108	84	208	** Reissue independent claims over original patent	
110	18	210	** Reissue claims in excess of 20 and over original patent	
SUBTOTAL (2)				(\$ 0)

\*\*or number previously paid, if greater; For Reissues, see above

### FEE CALCULATION (continued)

Fee Code	Large Entity Fee (\$)	Small Entity Fee (\$)	Fee Description	Fee Paid
105	130	205	65 Surcharge - late filing fee or oath	
127	50	227	25 Surcharge - late provisional filing fee or cover sheet	
139	130	139	130 Non-English specification	
147	2,520	147	2,520 For filing a request for reexamination	
112	920*	112	920* Requesting publication of SIR prior to Examiner action	
113	1,840*	113	1,840* Requesting publication of SIR after Examiner action	
115	110	215	55 Extension for reply within first month	
116	410	216	205 Extension for reply within second month	
117	930	217	465 Extension for reply within third month	
118	1,450	218	725 Extension for reply within fourth month	
128	1,970	228	985 Extension for reply within fifth month	
119	320	219	160 Notice of Appeal	
120	320	220	160 Filing a brief in support of an appeal	
121	280	221	140 Request for oral hearing	
138	1,510	138	1,510 Petition to institute a public use proceeding	
140	110	240	55 Petition to revive - unavoidable	
141	1,300	241	650 Petition to revive - unintentional	
142	1300	242	650 Utility issue fee (or reissue)	
143	470	243	235 Design issue fee	
144	630	244	315 Plant issue fee	
122	130	122	130 Petitions to the Commissioner	
123	50	123	50 Processing fee under 37 CFR 1.17 (a)	
126	180	126	180 Submission of Information Disclosure Stmt	
581	40	581	40 Recording each patent assignment per property (times number of properties)	40
146	750	246	375 Filing a submission after final rejection (37 CFR § 1.129(a))	
149	750	249	375 For each additional invention to be examined (37 CFR § 1.129(b))	
179	750	279	375 Request for Continued Examination (RCE)	
169	900	169	900 Request for expedited examination of a design application	
Other fee (specify) _____				
*Reduced by Basic Filing Fee Paid				
SUBTOTAL (3)				(\$ 40)

### SUBMITTED BY

### Complete (if applicable)

Name (Print/Type)	John A. Castellano	Registration No. Attorney/Agent	35,094	Telephone	703-668-8000
Signature		Date	September 12, 2003		

WARNING: Information on this form may become public. Credit card information should not be included on this form. Provide credit card information and authorization on PTO-2035.

Burden Hour Statement: This form is estimated to take 0.2 hours to complete. Time will vary depending upon the needs of the individual case. Any comments on the amount of time you are required to complete this form should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, Washington, DC 20231. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Assistant Commissioner for Patents, Washington, DC 20231.